565 631 In exchange for the rights of suzerainty which the Imochar exercise over the Imrad, they owe the latter absolute protection, defend their interests each time that they are threatened, and endeavor to obtain reparation if they are pillaged by an opposing tribe.

177 631 565 511 The Imochar spend lavishly as great lords and have kept this mania in spite of the change in regime brought by the French peace. Their way of living like parasites has taken away any idea of foresight, and because of this they are more often in want than well off. In fact, the first consequence of the French occupation was to stop the state of war and the pillaging, which deprived the Imochar of their principal resources. They became poor people, while the Imrad, as herd owners, saw their wealth increase and become stabilized. This social disturbance could have had serious consequences, but the Imrad did not totally abandon the Imochar, despite the opportunity which was offered them to emancipate themselves from their ancestral guardianship. Perhaps we can be glad of this, for one might wonder what the material situation of the Imochar would have been and, consequently, their state of mind with regard to us.

291 566 178 The terms "black Tuareg" and "white Tuareg" have often been used to designate the Imochar and the Imrad. "In the north," Seligman says, "the nobles have black veils and the subjects white ones." (1) This distinction in dress does not exist today, when the

1. Les races de l'Afrique, p. 129.

Tuareg indiscriminately wear black or white veils according to their taste and wealth. /161/ It is possible that the Imrad formerly could not obtain indigo veils, always considered a luxury item, and had to be content with ordinary cotton veils; that would explain the division into black and white Tuareg.

According to Duveyrier, the white Tuareg, "Touareg-el-biodh," were probably the Oulad Ba Hamou, Arabs of the region of In-Salah. They took from the Tuareg the habit of wearing veils, but in white instead of dark indigo.

565 Although their present situation is more prosperous than that of
[511] the Imochar, as we have said, they do not stop at considerations of
[177] prestige of the latter. Since the occupation, they have been able to raise an appreciable income through animal husbandry and caravans.

565 The Imrad are organized by tribes, electing a chief and respecting
631 matriarchal rules like the Imochar. They administer their affairs
[642] internally as they see fit, without intervention of the amenokal or the Imochar in their affairs.

162 In all of the confederations, the Imrad are more numerous than the Imochar, in a ratio of one to five (northern Tuareg) and one to eight (Ioullimmiden).

181 They are of a more peaceful nature than the Imochar, perhaps
565 because they are less virile and less courageous. Still, they were often taken on raids against their will by the Imochar, and, aided by
721 their taste for gain, they began before long to pillage on their own each time that a good opportunity presented itself. They often
[727] organized expeditions on their own initiative, but, if they were successful, they had to pay a certain share of the loot to the nobles. This was a guarantee for the future, the Imochar said, knowing full well that a raid brings about a counterraid, and that they were liable to suffer /166/ the repercussions of the "misconduct" of their vassals one day or another.

565 Some Imrad even acquire renown as great warriors, and some
701 Imochar have agreed to place themselves under their command during a raid, bowing to their superiority.

There are ordinary Imrad (goatherds) and warrior Imrad among
[714] the Ioullimmiden. The former did not take part in war, while the others were in all combats and, for that reason, had a right to the same armaments as the Imochar, but without the buckler.

565 Some tribes even became so strong militarily that they succeeded
631 in freeing themselves completely from Imochar guardianship. This is the case of the Kel Gossi /Gossi/ from the loop of the Niger.

565 Imochar sometimes marry Imrad women who are renowned for
[582] their beauty, but no inverse cases have come to our knowledge.

631 a very ancient tribe, the Isbeten, who were the autochthons of the Ahaggar and whom the Dag Rali would have found in Atakor when they came to settle there.

After the battle at Tit where they lost more than 100 fighters, the Dag Rali still numbered 60 warriors. The 1938 census gives 1, 090 persons, 334 of them men, including the Iklan. This increase is quite rare among the Tuareg and reflects their wealth and the improvement of their living conditions since the French occupation.

[161] [177] [511]

They nomadize in the western part of the Koudia, which is their absolute fief where no other fraction is admitted.

/192/ On the east, the boundaries of the lands over which they range are fixed by the right bank of the Tamanrasset wadi and the Interkadène wadi as far as Ideles; on the south by the southern zone of the Tahalra as far as Tin Dahar; on the west by In Eker; and on the north by the line from In Eker to Hirhafok to Ideles.

631 651 The Dag Rali pay a tribute of ten bags of dates or sorghum to the aménokal; in addition, each family which sends a caravan to the Sudan pays him a small bag of sorghum. If the pastures are good, they add several "botta" of melted butter and the milk of twenty ewes. In the case of a successful raid, they pay the nobles half of the ewes.

631 233 556 439 The Dag Rali are now the richest people in the Ahaggar. They own more than 1, 200 goats and more than 1, 000 camels. Thanks to their beasts of burden, they can take many very remunerative caravans to the Sudan and to the Tidikelt. They hold in common escheated flocks which are called Edjeré-n-boutelma. When the pastures are insufficient to feed all their livestock, they entrust their camels to the Irréguénaten who graze them on the Saharo-Sudanese border.

631 241 423 Since they are very open-minded, they were in favor of cultivation in the centers of the Ahaggar, and at the present time they possess lands at Ilâman, Tarahananet, Tamanrasset, Abâlessa, Iglen, Tafârit, I-n-Amegel, and Silet, which Negroes cultivate for them. The aménokal has granted them a certain number of palm trees in the Silet oasis which formerly belonged to the Taitok.

back by the Berabers after a hard fight and forced to flee, most of the men, including Aziouel, died of thirst in the desert.

/204/ As a consequence of this raid, Sidi ag Kéradji, now old, was relieved of his command and replaced by Amri ag Sidi Mohamed.

The Tăitok had also suffered a bitter defeat in 1887 at the Inifel well, where the Mouadhi Chaamba had destroyed a raid coming to attack them. This series of failures reduced the tribe to some 40 men.

At the present time, the Tăitok still accept unwillingly the suzerainty of the aménokal, more nominal than effective, under which they have been placed. Altercations, often violent ones, still take place between them and the Kel Rela. They have taken refuge in the Sudan, in the In Gall -- In Abangarit region, and more and more tend to want to pass under the control of the Sudanese authorities in order to have no more to do with the Kel Rela and the aménokal of the Ahaggar.

Poor like all the Imochar, the Tăitok live at the expense of their numerous Imrad. In times past they also levied a due on the nomadic Arab camps between the Ahnet and Akabli, and on the Asoudji and the Ferguémoussen of the Ădrar des Iforas, the Tégéhé-n-Ĕfis and Isoknâten of the Aïr.

Their group includes about 30 tents and possesses 300 to 400 camels and about 1,000 goats.

During the war of 1914-1918, Amri ag Sidi Mohamed, who at first had done all he could to please us, was one of the first to leave us for the camp of Kaocen, the chief of the revolt, led by his Imrad Kel I-n-Tounîn. But it must be said in his behalf that he did not take arms against our troops. He was taken prisoner before Agadez by the Sudanese troops.

As a result of these events, he was relieved of his command, and it was given to Mohamed ag Mohamed, the present amrar.

Through their Imrad, the Tăitok possessed the palm grove of Silet which was taken away from them by General Laperrine to punish them for their rebellion and given to Moussa ag Amastân.

114
533
631 forming the tobol" and, by extension, "servant of the tobol."

At the present time these three fractions number about 150 people.

[162] We call attention to them here only as a reminder.

Book V

Material Life

Chapter 1

Living Conditions Among the Ahaggar Tuareg

133 The Ahaggar, as we have already said, is a mountain refuge. We do not know why the Tuareg have continued to live there when they could have found much better countries to the south where they could have had a much easier life. Perhaps we should attribute this to attachment to the country or, quite simply, to an ancient state of things which forced them to take refuge against their will in the middle of the rocks.

13 A superficial examination shows that the Ahaggar is a very poor
[511] country with negligible resources, which imposes a living standard
[312] lower than the average. The pasture reserves are calculated, as are the water reserves. The subsoil possesses nothing, or almost nothing, which is marketable, except a little salt. Consequently, the possibilities for life there are quite limited. For the inhabitants to live, then, they must have recourse to outside resources.

According to what we know of the production of the cultivated lands of the Ahaggar itself and according to what the Tuareg are obliged to import, we may know approximately their needs. During the good years, local production is equivalent to only one quarter of the needs. It may be evaluated at 150 tons. To this must be added wheat production, but this cannot be taken in consideration insofar as consumption is concerned, since it is almost entirely destined for export. It follows from this that import needs amount to 4, 000 loads of millet a year, calculated at 150 kilograms each, making 600 tons, which are for the most part bought or exchanged at Damergou or in the Tahoua region. The annual demand for dates is 400 loads.

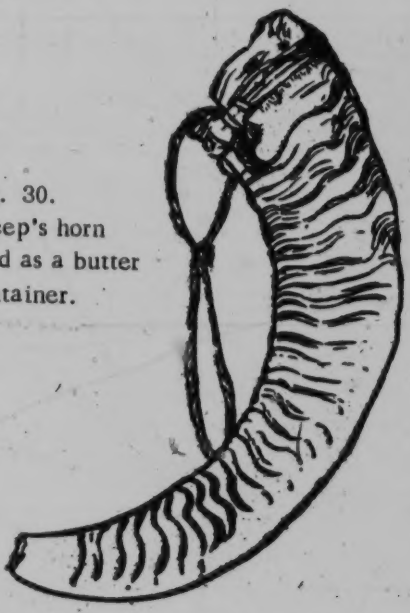

Fig. 30. Sheep's horn used as a butter container.

From these figures it follows that the annual needs per person are approximately one load of millet and one-tenth of a load of dates.

Individual consumption may thus be estimated at 187 kilograms of millet and 15 kilograms of dates per year, while an identical calculation /232/ for the Saharian Arabs has given us 180 kilograms of wheat and 75 kilograms of dates. But we must not deceive ourselves. These figures are drawn up for years, if not of abundance, at least of relative facility. Indeed, the annual average is very much lower, for the Ihaggaren do not always have at their disposal the means of exchange to meet their needs, and one may reduce the figures cited above by a good third, sometimes even by half.

5: Nicolaisen E-4, 5 (1951-1955) 1959
MS25 Tuareg MS25
Ahaggar

Tuareg of the Iboglan section of the Kel Rela clan, but as he now lives outside of Ahaggar the payment is made to the Amenokal.

In the past certain vassal clans or matrilineages of clans paid their tiouse to noble Kel Rela Tuareg other than the Amenokal, while apparently other clans or lineages gave tiouse both to the Amenokal and to other Tuareg of the Kel Rela clan. But according to my investigations this did not apply to vassals of the Iskkemaren class, who should pay tiouse to the Amenokal only. Duveyrier states that three Kel Rela sections (the Iboglan, the Inemba Kel Tahat, and the Inemba Kel Emori) each had their particular vassals constituting clans or parts of clans (Duveyrier 1864, p. 375 ff.). Benhazera gives a more detailed account of relations between noble and vassal Tuareg. According to him most vassal clans paid tiouse to the Amenokal, but some clans or parts of them also gave this tribute to other noble Tuareg. And apparently there might within one and the same noble section be several Tuareg who had their individual vassals from whom they received tiouse payments (Benhazera 1908, p. 139ff.).

Whole groups of Tuareg outside of Ahaggar also paid an annual tribute known as tiouse to the Amenokal or to other prominent noble Tuareg of Ahaggar in order to avoid raiding by the Ahaggar Tuareg. Thus the Adrar-n-Iforas Tuareg (the Kel Adrar) gave a skin tent and a camel annually to the Amenokal, but in spite of such annual tributes foreign Tuareg groups were frequently raided. If foreign Tuareg paying tiouse to the Amenokal were raided by people of Ahaggar, the Amenokal, according to Foucauld, had the right to a tribute named *ennehet*, about one third of the booty taken, to be paid him by all raiders whether noble or vassals. But raiders who were vassals of the Amenokal's drum-group should also give him half of the booty left when one third had been given. If the foreign group raided complained to the Amenokal to whom they paid tiouse for protection, he might return some of the animals taken, but never all (Foucauld 1951–52, III, p. 1347f.).

The tiouse paid to the Amenokal and other noble Tuareg by their vassals was also made in order that they should not be attacked or exploited by other Tuareg. But the relation *(temaɣlait* literally meaning "the root of the nail") between vassals and individual noble Tuareg had also an economic function, and was apparently of great value to both noble and vassal Tuareg. To make this clear I shall now briefly return to ecology.

In Ahaggar camels and goats are extremely complementary to one another. The camel supplies the Tuareg with milk, but with very few other products. And the Tuareg cannot always get milk from their she-camels which yield very little when pastures are dry. When grazing is good, camel's milk is important for food, but it is not well fitted for churning butter, and cannot be used for cheese. Camels are occasionally killed, but as their meat is not very suitable for drying, the Ahaggar Tuareg will kill camels to utilize their meat only when many people come together, as for instance at a marriage. Camel's hide is not very important in Tuareg craft, as tanning is not practised, and Tuareg camels have little hair which is used only for the manufacture of a few insignificant objects.

5: Nicolaisen E-4, 5 (1951-1955) 1959
MS25 Tuareg MS25
Ahaggar

for the manufacture of a few insignificant objects. To most Ahaggar Tuareg the camels have little direct economic value. But in raids of the past camels were very valuable riding animals, and they were then as now extremely important for caravan trading, which provides the Tuareg with most of their vegetable food.

The economic role of goat-breeding is very different. Goat-products play a very comprehensive part in Tuareg nourishment. Goat's milk is not only drunk, but is also made into butter and cheese which can easily be stored. Goat's meat is superior to camel's meat, and one goat does not contain more meat than can be eaten quickly by the members of a normal household. Furthermore goats are very important in Tuareg craft; tents, waterbags, and containers for different sorts of liquid and solid food are made predominantly from their skin, which was formerly also employed for whole garments. Goat's hair is extremely useful as material for ropes with which domestic animals are tethered, camel-loads are fastened, and the like.

Pastoral Tuareg could not survive in Ahaggar without goats. They might be able to subsist without camels, which can be replaced by donkeys as beasts of burden. But camels make life much easier to the Ahaggar Tuareg, who nowadays as in the past base their economy mainly on camels and goats. I think it is fairly correct to say that most Ahaggar Tuareg get their milk-food from goats, their vegetable food from caravan trading by camels.

Formerly the true vassal Tuareg of Ahaggar were not allowed to possess camels, which were owned exclusively by noble Tuareg. Foucauld says that 100–150 years ago the vassals had no camels, but he does not mention his source of information (Foucauld 1951–52, II, p. 534). But it is confirmed by many Tuareg that throughout the 19th century the vassals had not many camels, while they were rich in goats of which the noble Tuareg had very few. Goat products were given to noble Tuareg by vassals. As mentioned, goats and butter form part of the tiouse payments to the Amenokal, and were also an important part of the ticuse paid to other noble Tuareg of the Kel Rela. But the noble Tuareg who were masters of the small temažlait-units within the drum-group could apparently claim practically whatever they wanted from their vassals. The noble Tuareg, Duveyrier says, in reality had all rights over their vassals' property. But they were themselves interested in having rich vassals, and would not discourage them by claiming too much. When in need of riding camels the noble Tuareg could freely take animals from their vassals. The vassals had also an obligation to feed their noble lords, who at certain times would camp among them (Duveyrier 1864, p. 334ff.). This is also stated by Benhazera, but he claims that the vassals would not necessarily give everything demanded by noble Tuareg (Benhazera 1908, p. 54). The noble Tuareg of to-day have not ceased to claim food products and the like from their vassals. Poor noble Tuareg frequently ask gifts from their vassals, and there are even noble Tuareg who temporarily camp close to rich vassals from whom they acquire part of their food. Vassals may also lend their she-camels to noble Tuareg, who will return the animals when milk-yielding stops, and this is considered an old privilege of the nobility.

241 /75 cont./ is always the same: in a living wadi, between two rock shelves. They are to be found, then, within a radius of about 100 kilometers from the upper summits of the Atakor.

The gardens string out along the wadi, using to the best advantage the cultivable and irrigable land. An impressive checkerboard of guemouns served by lines of foggaras and séguias testifies to the industry of the harratin. The green patches of early wheat among the grayish natural vegetation make a curious sight; this verdure seems unreal. The agricultural centers are always found in picturesque surroundings. The villages have rare houses of toubs or of dried bricks, [342] but more common are tahli zéribas /reed shelters/. Misery there is endemic, and the word "destitution" takes on its [511] most absolute sense here.

I have personally known families, one of them with [262 nine children, who knew upon getting up in the morning, 511] at certain times of the year, that they had nothing to eat during the coming day and that it would be the same the next day and the days after that. Only the charity of one of their fellows, scarcely any better off, would save them from starvation.

It is true that lack of foresight is a determining factor in bringing about this destitution, but it is not the only factor; one must also cite the low fertility of the soil, the frequent lack of sufficient water, above all after a long dry period, the conditions of the agricultural contract which in effect prevent the hartani from developing a passionate interest in his land, and, lastly, the limited views and complete lack of initiative that characterize the harratin. It must be noted that the Tuareg are hostile to the development of agriculture; this hostility is scarcely a reasoned one; it is a matter of a kind of nomadic atavism, augmented by a desire to keep the traditional practices intact, and also by a fear of seeing the Ahaggar penetrated by foreigners who, undoubtedly, could make the land produce and, in particular, develop the /76/ palm groves, but who would not be hereditarily subordinate to their authority.

7:Nicolaisen E-5 (1951-1962) 1963 MS25 Tuareg MS25

133 Massif resembles Ahaggar, but it is on the whole much more level with broader valleys and in between the lower mountains there are clayey plains. Immediately east of the Massif is the very extended sandy 131 desert which is uninhabited. Further south than Adrar-n-Foras and Ayr there are no considerable mountains. Between the two massifs are the plains of Tamesna and Talak which continue into the plains of the Sudanese savannah.

Tuareg country consists predominantly of rocky mountains and flat, extensive plains of gravel and stone. This configuration is basic to our understanding of Tuareg economy as will become clear when we have outlined the characteristic features of climate.

132 Tuareg country is very hot in summer – so hot that even the nomads born and bred in the country suffer much from the heat at that season. The hottest months are May, June (farthest south) and July (farthest north). During these months temperature may exceed 50° centigrade, and is on average 30°–35°, or higher. In the uppermost mountain zone of Ahaggar nights are comparatively cool even in summer, while in the lower country there is often little difference between day and night temperatures. This is true in particular when, as often happens in summer, the sky is overcast during the night and consequently there is little radiation of the heat absorbed by rocks and sand in daytime. The day temperature in summer is normally higher than the temperature of the human body, and the temperature of sand and rocks will rise to 60°–70°. Travelling is extremely hard under such conditions, 484 and most people spend the day in the shade of rocks and trees, sleeping and drinking water of which 271 an adult person consumes 8–10 litres a day. Violent winds are common in the Sahara most of the year and in particular in the daytime; in summer these winds are usually very hot and add considerably to the discomfort of the climate, as do the numerous flies.

The country of the Northern Tuareg has a rather continental climate characterized by great fluctuations of temperature during the year. Although Tuareg suffer from heat in summer, they do not generally complain much about it, and they consider the comparatively cold winter much worse than the hot summer. In winter, temperature in the country of the Northern Tuareg averages about 10°. The absolute minimum temperature however is very much below this. Thus in Ahaggar the village of Tamanrasset (1400 m) has in January an average temperature of 11,7°, but an absolute minimum of −6,6°. Frost is very common during winter nights, and even snow may fall in the higher parts of Ahaggar at that time of the year. In the country of the Southern Tuareg frost may also occur, but in Southern Ayr around Agadez frost is said to be very rare and snow is unknown; the winter period 511 in the south is on the whole milder than in the north, where the changes between relatively cold and 164 very hot temperatures, allied with inadequate dwellings and clothes, are responsible for pneumonia and similar diseases, which give rise to frequent deaths – especially among children.

The most important climatic distinction between the countries of Northern and Southern Tuareg is due to differences in the annual precipitation as will be seen from the following figures (in m/m) for the annual rainfall 1931–1945 in the territories of seven Tuareg groups:—

7:Nicolaisen E-5 (1951-1962) 1963 MS25 Tuareg MS25

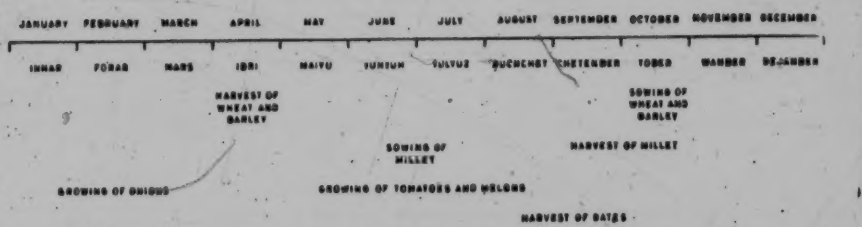

Fig. 139. Horticultural calendar from Ahaggar.
The Tuareg and the negroid agriculturists have a lunar calendar of twelve months corresponding to the Arab calendar, but a lunar calendar has no practical value for the indication of seasonal agricultural activities. The Julian Calendar is known to some people of Ahaggar as well as to other Berbers of the Sahara and the Atlas. Tuareg names of Julian months are given above. Very few people in Ahaggar know the exact beginning and the end of the twelve Julian months, but a few names are used as seasonal terms: *innar* "midwinter", *mars* = "beginning of spring", *ibri* "early harvest" (of wheat and barley), *maiyu* "beginning of summer", *tober* = "late harvest" (millet).

which no definite figures can be given, while the yield of fruit trees growing in the garden plot does not necessarily belong to the agriculturist. These trees frequently belong to pastoral Tuareg.

I think it can be estimated that an agricultural household with its own garden produce about a thousand kilos of vegetables food products annually for its private use. We can add that though the members of an agricultural household live mainly on vegetable food products they also acquire a certain amount of food from livestock, which normally comprises a few goats and sheep, and perhaps one or two zebus. Conditions of stock-breeding are not always favourable to people who live continuously on the same spot, but it is advantageous to the agriculturists of Ahaggar, who live close to valleys with some pasture, that they are able to feed their animals on green garden products when pasture is badly developed and thus avoid the disaster of a drought. It is also an advantage to most agriculturists that they do not have to water their animals which can drink freely from the irrigation canals. The agriculturists can kill a few goats or sheep annually, they obtain milk and a little butter to be used mainly as a sauce for bread and porridge, and they make cheese of the *awles* type (cf. p. 224), but they never make cheese from fresh milk as do many pastoral Tuareg when milk is abundant. The agriculturists also breed fowls and pigeons, and some of them have an important meat supply from hunting with steel-traps (hares, jackals, fennecs, and ravens). Collecting, on the other hand, is of little or no value to irrigation farmers of Ahaggar.

The economic position of agriculturists who work without any particular obligations towards pastoral Tuareg is tolerably good. It is less favourable to those who grow winter crops also on behalf of the Tuareg, as do most cultivators. Some of them irrigate the garden plot with water raised from wells by oxen which may belong to the cultivator or to the Tuareg. But most agriculturists who work for the pastoral Tuareg irrigate by means of *foggara*. It is very strenuous work to dig a *foggara* canal, and co-operation is needed not only for this but also for the maintenance of the whole irrigation system. The gardens are individually tended by the agriculturists, who co-operate in the *foggara* work under the leadership of a headman known as *amɣar n efeli*, that is "chief of the *foggara*". This headman is

7:Nicolaisen E-5 (1951-1962) 1963 · MS25 Tuareg MS25

obtain a larger amount of vegetable food products and more wheat and barley. The pastoral Tuareg gain less from their gardens than they did when the *khamast* system prevailed, but it is still profitable for them to be garden owners.

The quantity of agricultural products anually consumed per person among the *Kel Ahaggar* is estimated by Lhote at 187 kilos millet, 15 kilos dates, and a small amount of wheat for which no figure is given. For Arabs of the Sahara the quantity of vegetable food is estimated at 180 kilos wheat, and 75 kilos dates anually per person (Lhote 1955a, p. 263). I add to this that wheat is used for bread to a very large extent by the Ahaggar Tuareg, who also make much use of barley for bread and porridge. According to Malaurie the amount of agricultural food products available per person among the Ahaggar Tuareg is about 400 grammes a day, or 146 kilos anually (Malaurie 1953, p. 342). It should be noted again that the amount of agricultural food products necessary for a Tuareg household varies greatly from one year to the other. In years of drought when agricultural products form so to speak the only source of food for the nomads, they estimate that a household consisting of husband, wife, and one child will consume about two kilos of cereals (dates) every day, or 730 kilos in a year. Consequently the amount of cereals and dates consumed anually per person may in dry years rise to about 245 kilos. This seems to correspond to the amount of food considered necessary for Arabs of Tidikelt and Tawat, who live almost exclusively on cereals and dates. When employed as labourers by the French Administration these sedentary Arabs are given 16 kilos of wheat and 4 kilos of rice a month, or 240 kilos of agricultural products anually per person (Information obtained from the administration office of In Salah in 1954). The agricultural products obtained by a pastoral household from a single garden will not meet the needs of the household and its slaves even in years of good grazing, and less so in dry years when pastoralists subsist entirely on agricultural food products. I give an example: During the year 1954 55 which was extremely dry, a Tuareg who owned three gardens cultivated with an *aṛil* agreement could not feed his household and his slaves (comprising two men, two women, and three children from five to twelve years old) by means of his own garden products. The Ahaggar Tuareg depend on caravan trading for their provisions of agricultural food, and trading also helps them to create the capital of millet and dates which is invested in their gardens in Ahaggar grown on their behalf by agriculturists. I believe that most pastoral households of Ahaggar have gardens, but there are Tuareg who have none. This is true, for instance, of most Tuareg living in and around the Ahnet Massif. Tuareg of this region formerly had gardens irrigated by the *foggara* system at Abalessa, but to-day they acquire their vegetable food products mainly by caravan trading.

IRRIGATION AGRICULTURE IN AYR

The largest aggregation of sedentary people in Ayr is found in Agadez (4.737), which is inhabited almost exclusively by negroid peoples who speak Hausa though most of them also know the Tuareg language (*tamacheḳ*). This large sedentary population mainly lives on trade and on crafts of various kinds. The inhabitants are known to the Tuareg as the *Imeggedezen*. They are said to be related to the Sultan (or the *Amenukal*) of Agadez. There is a tradition which claims that the Sultan came

7:Nicolaisen E-5 (1951-1962) 1963 MS25 Tuareg MS25

433 439 in the Sudan for such articles as camel saddles, sandals, swords, millet mortars, indigo cotton, earthenware pots, and the like. The Tuareg may also buy quantities of butter and cheese for sale to the sedentary people of Tidikelt and for their own use in dry years.

The Sudanese trade constitutes the great stabilizing factor in the economy of pastoral Tuareg of [262] Ahaggar. In return for the valuable rock-salt, pastoral Tuareg obtain the bulk of their agricultural food products (millet), butter and cheese for their own consumption in dry years, many important artefacts and notably their camel saddles and their millet mortars. They also get a surplus of millet and goods for investment in their Ahaggar gardens and for selling to the sedentary people of the Tidikelt oases.

There are certain Tuareg who do not engage in the Sudanese salt trade, notably those living in Ahnet; and these Tuareg nowadays have no irrigated gardens either. They acquire their necessary vegetable food products from Tidikelt (dates) and from Abalessa and Tamanṛaset (wheat). They buy these vegetable products with their surplus of goats, sheep, camels, butter and cheese, and an occasional [511] barbary sheep. In a good year they can meet their needs of food in this way, but it is most difficult for them to subsist in dry years; and it may happen that two dry years come in succession. When I [114] stayed among the Ahnet Tuareg in 1954–55, all camps visited were very short of food, while the Tuareg of the Ahaggar Massif who engage much in the salt trade (the *Dag Ṛali* and the *Aguh-en-tehlé*) possessed what they needed of wheat, barley, dates, and millet.

[364] To-day there is a rather important market at Tamanṛaset where many Tuareg sell surplus livestock, and where they can also buy cereals and dates. But it is always profitable to sell livestock and meat [435] in the Tidikelt oases where meat, butter and cheese are very expensive articles. Dates are cheap in these ooo oases, European goods and woven blankets are also cheaper than at Tamanṛaset. The trading expedi-

804 322 177

Fig. 150. Wooden measure (*muda*) which contains one kilo of cereals, or the like. The Tuareg have adopted the kilogramme into their own weight system. The proper Tuareg unit is the *taṣiwa* which, according to Foucauld, corresponds to three kilogrammes (Foucauld 1951–52, III, p. 1160), but nowadays the Ahaggar Tuareg count one *taṣiwa* as equal to two kilogrammes and a half. The Tuareg have wooden or metal measures of *taṣiwa* size, and there are also larger measures to be used for grain, dates, and the like. For units smaller than *muda* the Tuareg sometimes use a wooden measure called *tanaḳast* which holds half a kilogramme. Smaller quantities are measured with the hand held half open, and it is recognized in Ahaggar that one *taṣiwa* corresponds to 99 handfuls. In Ayr it is very common to use a little plaited bowl (*téfakemt*) as the smallest unit of measurement. Dimension: 0.140 m high, 0.125 m in diameter at the rim. (F.M. 168).

7:Nicolaisen E-5 (1951-1962) 1963 MS25 Tuareg MS25

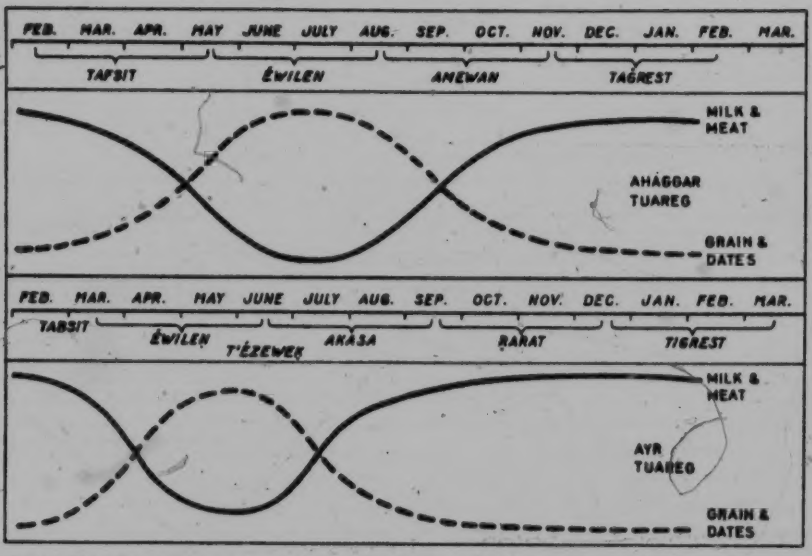

Fig. 151. The relative importance throughout the year of food derived from stock-breeding and vegetable products mainly comprising agricultural products. The curves describe conditions in good years for wealthy families. However, milk (and meat) is less important to most Ayr families than indicated in the diagram which covers a household making use of the particular type of annual pasture which remains green throughout winter, notably *alwat* (*Schouwia purpurea ssp. Schimperi*) *adreyial* (*Astragalus Vogelii*), and *tagellet* (*Colocynthis vulgaris*). – This diagram should be compared with Fig. 14 where climatic and botanical changes throughout the year are outlined.

it is remunerative to buy an extra supply of millet in Damergu and to exchange it for dates and salt at Bilma. Caravan trading is a source of profit to the Ayr Tuareg, but most of them ultimately acquire their agricultural food products in exchange for stock and stock-breeding products. Very few of them mine salt at Amadror, and most of them obtain salt in return for millet bought for domestic animals in Damergu, or for meat of domestic animals butchered in Ayr. The Tuareg cannot easily subsist without agricultural products but they can obtain them in exchange for their livestock.

We see again that conditions of stock-breeding are very favourable in Ayr in comparison with those of Ahaggar and in Tasilé-n-Ajjer, where frequent drought periods make it difficult for the Tuareg to exist. It is easily understandable that the favourable grazing conditions of Ayr have caused many Tuareg of the north to migrate southwards. These migrations take place even to-day and have gone on for centuries (cf. p. 411 ff.). However, even in Ayr it is most difficult to subsist without cultivated cereals (millet), and we must do away with the myth that pastoralists of North Africa live entirely on milk and meat from their animals – they do not. This is true for all Tuareg I have visited, including

7:Nicolaisen E-5 (1951-1962) 1963 MS25 Tuareg MS25

412
631
264
824
564

Fig. 194a–c. Bowl-like ladles from Ahaggar and Ayr. They are used mainly for eating liquid dishes – in particular for the dish known as *ayzhara* (Ahaggar) or *ayrira* (Ayr).

a. Ladle (*tamulat*) cut by blacksmith from wood of the *taburaḳ* tree (*Balanites aegyptiaca*). Ahaggar, blacksmiths of Abalessa. Dimension: 0.285 m long, 0.110–0.120 m in diameter (the bowl). (N.M. G. 5845).

b. Ladle (*tamulat*). Ayr, Agadez. Dimension: 0.330 m long. (N.M. G. 6631).

c. Ladle-like bowl (*assaṛ*) cut by blacksmith from wood of the *taburaḳ* tree (*Balanites aegyptiaca*). Ahaggar, *Ahl Azzi* Arabs of Tamanṛaset. This ladle-like bowl was not used for food but for conservation of fine-grained sand used for hair-dressing together with water and butter. Dimension: 0.330 m long, 0.120 m in diameter (the bowl). (N.M. G. 5879).

[302]

264 frequently consisting of bread or porridge eaten rather late at night. The Ayr Tuareg have related terms for their meals:— (1) *tegimgimt* which is a prepared meal eaten late in the morning. (2) *témekkelewt* which is the prepared meal taken at midday. (3) *temegimt*, late evening meal which is the main meal in Ayr, as in Ahaggar. In addition to these meals there is a very light meal taken with tea immidiately after rising. It is known as *elfetur*.

[272]

[311] Incidentally there are Tuareg who do not have food enough to eat three times a day.

During times when Tuareg subsist exclusively on milk they have no regular meals. The amount of milk needed to support life is very great, and it is drunk slowly during the day. On extensive journeys when the camels cross the barren deserts, the Tuareg also do not have regular meals as they do in their camps.

[489]

[Text continues on p. 255]